

## Marketing Bulletin

**DATE:** January 1<sup>st</sup>, 2006  
**TO:** All Sales Personnel  
**FROM:** Mark Stoner  
**RE:** Product Termination

To all concerned parties,

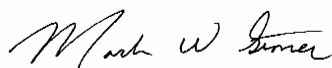
This bulletin is to notify all customers of the discontinuation of the following Ecliptek series effective January 1<sup>st</sup>, 2006:

<b>Series</b>	<b>Description</b>	<b>Recommended Replacement</b>
E2WS	SMD Watch Crystal	E1WS, E5WS, E6WS

In compliance with our End of Life (EOL) policy, this will serve as advanced notice of product termination. New orders will not be accepted after February 1<sup>st</sup>, 2006, with delivery to conclude by May 1<sup>st</sup> 2006.

If there are any questions pertaining to this bulletin, please feel free to contact me. Thank you again for your cooperation.

Best Regards,

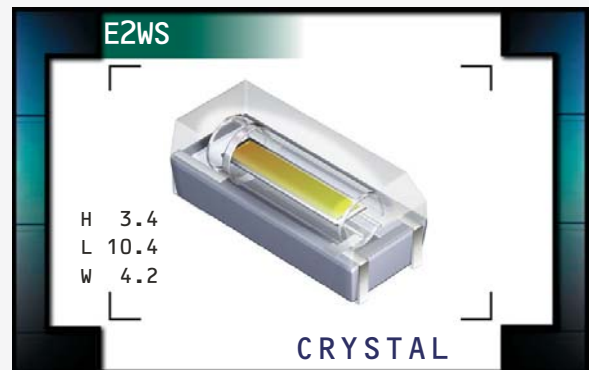


Mark W. Stoner  
Director of Marketing  
Ecliptek Corporation

# E2WS Series



- RoHS Compliant
- 32.768kHz watch crystal
- Miniature four pad surface mount package
- $\pm 20$ ppm frequency tolerance
- 6.0pF or 12.5pF load capacitance available
- Tape and reel available



## NOTES

OBSOLETE

### ELECTRICAL SPECIFICATIONS

Frequency	32.768kHz
Frequency Tolerance (at 25°C)	$\pm 20$ ppm
Frequency Stability	-0.042ppm / $(\Delta^\circ\text{C})^2$ Maximum, Parabolic; Turn Over Temperature at 25°C $\pm 5^\circ\text{C}$
Operating Temperature Range	-40°C to 85°C
Aging (at 25°C)	$\pm 3$ ppm / year Maximum
Storage Temperature Range	-55°C to 125°C
Shunt Capacitance	0.85pF Typical, 2pF Maximum
Motional Capacitance	2.0fF Typical
Equivalent Series Resistance	60,000 Ohms Maximum
Insulation Resistance	500 Megaohms Minimum at 100V <sub>DC</sub>
Drive Level	1 $\mu$ Watt Maximum
Load Capacitance (C <sub>L</sub> )	12.5pF or 6pF

MANUFACTURER  
ECLIPTEK CORP.

CATEGORY  
CRYSTAL

SERIES  
E2WS

PACKAGE  
PLASTIC

CLASS  
CR48

REV. DATE  
09/05

PART NUMBERING GUIDE

E2WSDC 12 - 32.768K TR

LOAD CAPACITANCE

06=6pF  
12=12.5pF

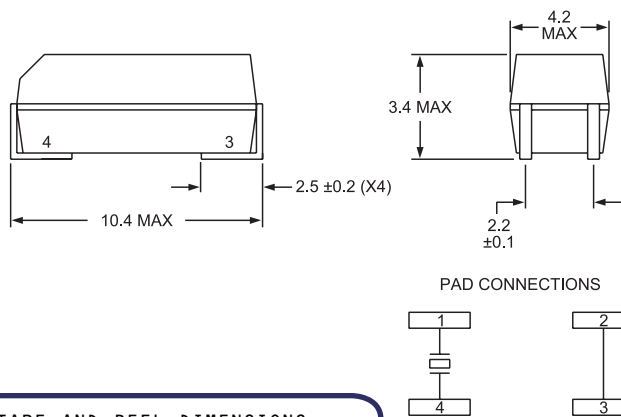
PACKAGE OPTIONS

Blank=Bulk, TR=Tape and Reel

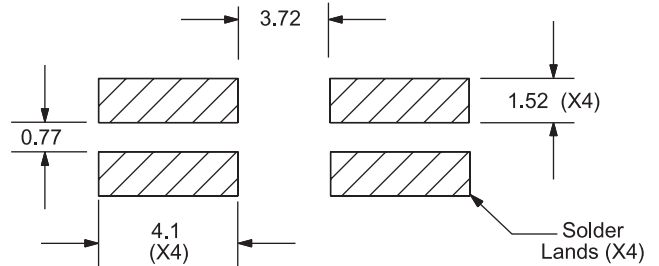
NOTES

OBSOLETE

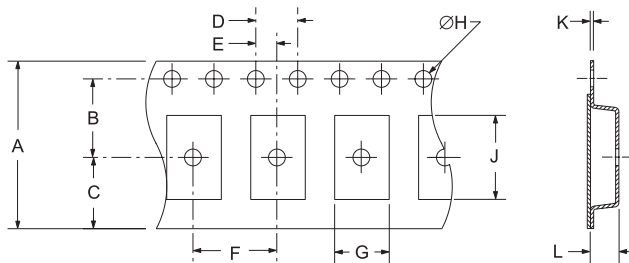
MECHANICAL DIMENSIONS  
ALL DIMENSIONS IN MILLIMETERS



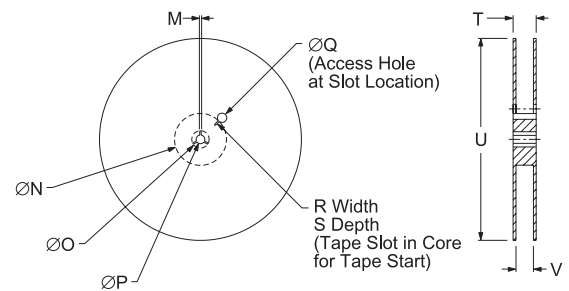
SUGGESTED SOLDER PAD LAYOUTS  
ALL DIMENSIONS IN MILLIMETERS



TAPE AND REEL DIMENSIONS  
ALL DIMENSIONS IN MILLIMETERS

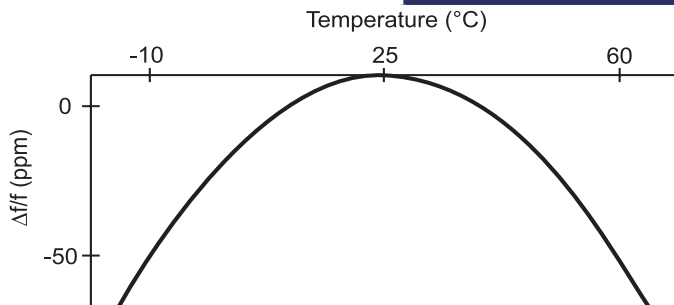


TAPE	A	B	C	D	E
	16±.3	7.5±.1	6.75±.1	4±.2	2±.1
F	G	H	J	K	L
8±.2	4.35±.1	1.5+-.2-1	10.7±.2	.5±.05	3.7±.2



REEL	M	N	O	P	Q
	1.5 MIN	50 MIN	20.2 MIN	13±.2	40 MIN
R	S	T	U	V	QTY/REEL
2.5 MIN	10 MIN	22.4 MAX	360 MAX	16.4+2-0	2,000

PARABOLIC TEMPERATURE CURVE



MARKING SPECIFICATIONS

Line 1: C2K XXXX  
 Lot Identifier (4 or 5 Characters)  
 Frequency Code

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